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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.	
10/729,742	12/05/2003	Stephen Griffin	Stephen Griffin 1001.1727101		
28075 CROMPTON.	7590 03/16/200° SEAGER & TUFTE, L	EXAMINER			
1221 NICOLLI	•	HOEKSTRA, JEFFREY GERBEN			
SUITE 800 MINNEAPOLI	IS, MN 55403-2420	ART UNIT PAPER NU			
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SHORTENED STATUTORY PERIOD OF RESPONSE MAIL DATE		MAIL DATE	DELIVERY MODE		
3 MO	NTHS	03/16/2007	PAPER		

Please find below and/or attached an Office communication concerning this application or proceeding.

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

			Application No.		Applicant(s)			
Office Action Summary			10/729,742		GRIFFIN ET AL.			
		Examiner		Art Unit				
			Jeffrey G. Hoeks	stra	3736			
Period fo	The MAILING DATE of this commun or Reply	ication app	ears on the cove	r sheet with the c	orrespondence ad	ddress		
A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.  - Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.  - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.  - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).								
Status								
1)  🛛	Responsive to communication(s) file	ed on <i>05 M</i> a	arch 2007.					
·	This action is <b>FINAL</b> . 2b) $\boxtimes$ This action is non-final.							
3)	Since this application is in condition for allowance except for formal matters, prosecution as to the merits is							
	closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.							
Disposit	ion of Claims							
4)⊠	Claim(s) 1-21 is/are pending in the a	application.						
•	4a) Of the above claim(s) <u>8</u> is/are withdrawn from consideration.							
5)	5) Claim(s) is/are allowed.							
6)⊠	6)⊠ Claim(s) <u>1-7 and 9-21</u> is/are rejected.							
7)	Claim(s) is/are objected to.							
8)[	Claim(s) are subject to restrict	ction and/or	election require	ement.				
Applicati	ion Papers							
9)[	The specification is objected to by th	e Examiner	г.					
10)	The drawing(s) filed on is/are:	a) 🗌 acce	epted or b) 🔲 ob	jected to by the E	xaminer.			
	Applicant may not request that any obje	ction to the c	drawing(s) be held	l in abeyance. See	37 CFR 1.85(a).			
	Replacement drawing sheet(s) including	the correcti	on is required if th	e drawing(s) is obj	ected to. See 37 C	FR 1.121(d).		
11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.								
Priority (	under 35 U.S.C. § 119							
12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). a) All b) Some * c) None of:								
	1. Certified copies of the priority documents have been received.							
	2. Certified copies of the priority documents have been received in Application No							
	3. Copies of the certified copies of the priority documents have been received in this National Stage							
application from the International Bureau (PCT Rule 17.2(a)).  * See the attached detailed Office action for a list of the certified copies not received.								
and and analysis actuated critical action for a list of the definited copies not received.								
	•							
Attachment(s)								
1) Notice of References Cited (PTO-892) 2) Notice of Draftsperson's Patent Drawing Review (PTO-948) 4) Interview Summary (PTO-413) Paper No(s)/Mail Date								
	e of Draftsperson's Patent Drawing Review (F mation Disclosure Statement(s) (PTO/SB/08)	5) 🗌	Notice of Informal Pa					
	r No(s)/Mail Date		6)	Other:				

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#### **DETAILED ACTION**

### **Notice of Amendment**

1. In response to the amendment filed on 03/05/2007, canceled claim(s) 22-25 is/are acknowledged. The previous rejection of claims 1-7 and 9-21 is *withdrawn* and the following new and reiterated grounds of rejection are set forth:

## Claim Rejections - 35 USC § 102

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

- (e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.
- 3. Claims 1-7, 9-10, 14-15, 18, and 21 are rejected under 35 U.S.C. 102(e) as being anticipated by Furnish (US 6,873,868 B2).
- 4. For claims 1-6, 9-10, 14, 18, and 21, Furnish discloses a catheter (120 as best seen in Figure 7), comprising:
- an elongate shaft (122) having a proximal region (the right-most region of the device seen in Figure 7), a distal region (the left-most region of the device seen in Figure 7), an exterior surface (126) extending therebetween, and a lumen (136) extending therebetween:

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 a plurality of support tracks (124) disposed on the external surface of the elongate shaft, the support tracks being axially aligned with the elongate shaft, and the support tracks integrally extruded with the elongate shaft;

- a plurality of support ribs (130), a removable support means providing column support to the elongate shaft, that are disposed over at least a portion of the exterior surface of the elongate shaft and configured to be removably disposed over at least a portion of the plurality of support tracks via axial sliding (column 8 lines 33-37); and
- wherein the plurality of support tracks function as anchoring means for securing the removable support means (as best seen in Figures 1A-1C) and have a crosssectional profile configured to permit the removable support means to move axially with respect to the elongate shaft while limiting relative radial movement (column 8 lines 33-37) and complementary to the cross-section profile of each of the plurality of support tracks, and
- wherein the distal region of the elongate shaft includes a distal end (the left-most tip
  of the device seen in Figure 7), and the plurality of support tracks extend from a
  position proximate the proximal region of the elongate shaft to a position proximal of
  the distal end of the elongate shaft.
- 5. For claims 7 and 15, Furnish discloses a catheter (120), wherein the plurality of support tracks comprise four support tracks that are axially aligned along the elongate shaft and disposed such that each support is radially equidistantly spaced around the radius of the elongate shaft (as best seen in Figure 7).

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## Claim Rejections - 35 USC § 103

6. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

- (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 7. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).
- 8. Claims 11-13 are rejected under 35 U.S.C. 103(a) as being unpatentable over Furnish in view of Rammler (US 5,327,891). Furnish discloses the claimed invention except for explicitly disclosing the plurality of support tracks having a cross-section profile, comprising: an ovoid cross-section having a minor dimension perpendicular to the exterior surface of the elongate surface and a major dimension perpendicular to the minor dimension, wherein the major dimension varies as a function of distance from the exterior surface of the elongate shaft, and wherein the major dimension is minimized at a position proximate the exterior surface of the elongate shaft and is maximized at a position radially displaced from the exterior surface a distance equal to or less than the

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minor dimension. Rammler teaches a catheter (80) with a plurality of support tracks (82 and 94) having a cross-section profile, comprising: an ovoid cross-section having a minor dimension perpendicular to the exterior surface of the elongate surface and a major dimension perpendicular to the minor dimension, wherein the major dimension varies as a function of distance from the exterior surface of the elongate shaft, and wherein the major dimension is minimized at a position proximate the exterior surface of the elongate shaft and is maximized at a position radially displaced from the exterior surface a distance equal to or less than the minor dimension (as best seen in Figure 4). It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the catheter as taught by Furnish, with the catheter as taught by Rammler for the purpose of configuring the geometry of a catheter support track for increased patient safety by structuring the catheter in a manner conducive to traversing bodily vasculature.

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9. Claims 16 and 17 are rejected under 35 U.S.C. 103(a) as being unpatentable over Furnish in view of MacDonald et al (US 6,210,396, hereinafter MacDonald). Furnish discloses the claimed invention except for explicitly disclosing attaching a portion of a catheter device by heat bonding or adhesives. MacDonald teaches attaching a portion of the catheter by using either heat bonding or adhesives (column 9 lines 58-60). It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the catheter as taught by Furnish, with the catheter as taught by MacDonald for the purpose configuring the material properties of

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a catheter support for increased patient safety by structuring the catheter in a manner conducive to traversing bodily vasculature.

10. Claims 19-20 are rejected under 35 U.S.C. 103(a) as being unpatentable over Furnish in view of Rammler. Furnish discloses the claimed invention except for explicitly disclosing the plurality of support ribs comprising a fluorinated polyethylene polymer and specifically polytetrafluoroethylene. Rammler teaches a catheter (80) with a plurality of support ribs (86 for example) comprising a fluorinated polyethylene polymer and specifically polytetrafluoroethylene (column 3 lines 21-23). It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the catheter as taught by Furnish, with the catheter as taught by Rammler for the purpose of configuring the material properties of a catheter support for increased patient safety by structuring the catheter in a manner conducive to traversing bodily vasculature.

## Response to Arguments

11. Applicant's arguments with respect to claims 1-7 and 9-21 have been considered but are most in view of the new ground(s) of rejection.

#### Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jeffrey G. Hoekstra whose telephone number is (571)

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272-7232. The examiner can normally be reached on Monday through Friday, 8:00 a.m. to 5:00 p.m. EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Max F. Hindenburg can be reached on (571) 272-4726. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

JH JH

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